BOOK REVIEW

Discovering the Unknown Landscape: A History of America's Wetlands by Ann Vileisis. 1997. xii+433 pp. illustrations, photos, appendix, map, index. ISBN 1-55963-314-X \$27.50 (cloth). Island Press, Washington, DC.

In the preface (p. xi-xii) of Discovering the Unknown Landscape: A History of America's Wetlands, author Ann Vileisis states that, "The matter of wetlands and their conservation is not a matter of science alone—but one of culture as well." Building upon this thesis, Vileisis examines the interactions between Americans and their neighboring wetlands from colonial to modern times. Throughout the narrative, readers learn how the 221 million acres of wetlands that were once distributed across America were systematically reduced to approximately 102.3 million acres by the 1990s. Efforts to develop and exploit wetland habitats as well as the more recent desire to conserve wetlands are examined within the prevailing political, economic, and environmental trends of American society. From the harvesting of salt marshes by New England colonists to the levee systems of the United States Army Corps of Engineers, readers learn how various attitudes and policies permanently altered the complexion of the continent.

Concepts of wetland science are frequently discussed in the text. However, the objective of the narrative is not to explain details of wetland biology and hydrology, but instead to chart the actions of society as the ecological values of wetlands became better understood. Throughout Discovering the Unknown Landscape, the complex interactions of government agencies, politicians, and private citizens are illustrated. The eighteen chapters have titles such as, "A Landscape on the Periphery," "Wetlands Portrayed and Envisioned," "Federal Bulldozers and Draglines," "The Reagan Agenda Challenges Wetland Gains," and "The Promise of Restoration." Each chapter is divided into several subtopics relating different aspects of the chapter theme. Regions that are revisited throughout the book include the Florida Everglades, the bottomland swamps of Louisiana, the riparian wetlands of the Mississippi drainage, the prairie potholes of the upper Great Plains, and the Central Valley of California. Some of the topics discussed include:

- the early perceptions of wetlands, including those of writers and artists
- the consequences of the Swamp Land Acts of the mid-1800s
- contradictory federal policies, some of which promoted wetland reclamation for agriculture and economic development, while other legislation encouraged wetland conservation
- the continued degradation of the nation's wetlands by a swelling post-World War II population, and the increasing efforts of conservationists at local, state, and federal levels
- the Federal Water Pollution Control Act of 1972 (the Clean Water Act) and the debate over the regulation of wetland development through the interpretation of Section 404
- the environmental impacts of the Reagan administration, the "no net loss" wetland directive of the Bush administration, and the policies of the Clinton administration as well as the 104th Congress

Vileisis has provided a thorough summation of an extensive and complex topic within American environmental history. The narrative is organized well and reads smoothly despite the abundance of agency acronyms and references to legislation that potentially could make prose cumbersome. As one decade sets the tone for the next, the reader gains an awareness of the historical precedents that have contributed to contemporary wetland issues.

Discovering the Unknown Landscape has been extensively researched. The 64 pages of notes organized by chapter are a useful resource. The notes contain a wealth of information cited from diverse sources ranging from technical government documents and academic histories to the popular press. A 12-page index, numerous archival photographs and illustrations, and the occasional map and graph also enhance the text.

The one page appendix entitled "Some Common and Scientific Names of Wetland Plants" consists of a wide spectrum of species with both cosmopolitan (e.g., *Phragmites australis* and *Typha latifolia*) and regional (e.g., *Avicennia germinans* and *Cladium jamaicense*) distribution patterns. Among this list of plant species there are some editorial problems, including a few misspellings such as *Lythrum salarica* [sic] and some taxonomic confusion. The scientific name *Scirpus acutus* includes the author citation when all other species have the author omitted. *Spartina pectinata* is placed in the list three times under various names; it is cited

with the common names "black grass," "sloughgrass" (under the synonym S. michauxiana), and "prairie cordgrass." The common name prairie cordgrass was paired with the apparently non-existent scientific name S. pectiana (see Kartesz 1994). Regarding other common names, Nymphaea odorata is cited oddly as "water lily tuber," and "sheep laurel" (Kalmia angustifolia), is erroneously paired with the scientific name for mountain laurel (K. latifolia), an upland laurel species.

Discovering the Unknown Landscape has provided an important service by placing our scientific knowledge of wetland values within the framework of our nation's history. Vileisis (p. 350) concludes by stating that, "Informed by history, we can remember the trade-offs already made and turn away from the mistakes and misunderstandings of a time when we knew no better." This enhanced perspective is a valuable complement to the wetlands dialogue that too frequently finds human economics and development at odds with environmental concerns. While reading the story of our American wetlands it becomes painfully apparent that as a nation we have not really "discovered the unknown landscape." Instead, by using our technological and engineering prowess, we have attempted to conquer a vital feature of our natural topography that too often has been viewed as a blight rather than a blessing.

Discovering the Unknown Landscape is an informative addition to the literature of the history, politics, and public perceptions of American wetlands. At the conclusion of the first chapter, Vileisis (p. 10) observes that, "Perhaps a newfound awareness of wetlands can inspire and nourish a vision of stewardship for these long-abused and misunderstood landscapes." Discovering the Unknown Landscape contributes significantly to the ongoing effort to elevate the importance of wetlands in our nation's conscience. Readers will gain a clear appreciation for the issues that have defined the relationships between American culture and the wetlands that are finally beginning to be appreciated and better understood. For educators, conservationists, consultants, politicians, or any reader with a general interest in the history of American wetlands, Discovering the Unknown Landscape is a thought-provoking synthesis and a highly recommended resource.

LITERATURE CITED

KARTESZ, J. T. 1994. A Synonymised Checklist of the Vascular Flora of the United States, Canada, and Greenland. Timber Press, Portland, OR.

-C. ERIC HELLQUIST, 391 West Road, Adams, MA 01220.